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SERIAL NUMBER	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.
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08/353,942 12/12/94 SEGALITA

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EXAMINER
JOHNSTON, J. M.

13M1/1019

ART UNIT PAPER NUMBER

BRUCE J. HENDRICKS
DEPARTMENT 823
THE GOODYEAR TIRE & RUBBER COMPANY
1144 EAST MARKET STREET
AKRON, OH 44316-0001

1301

18

DATE MAILED: 10/18/95

This is a communication from the examiner in charge of your application.
COMMISSIONER OF PATENTS AND TRADEMARKS

☒ This application has been examined ☒ Responsive to communication filed on 12/12/94 ☐ This action is made final.

A shortened statutory period for response to this action is set to expire 3 month(s), X days from the date of this letter.
Failure to respond within the period for response will cause the application to become abandoned. 35 U.S.C. 133

Part I THE FOLLOWING ATTACHMENT(S) ARE PART OF THIS ACTION:

- | | |
|---|---|
| 1. <input checked="" type="checkbox"/> Notice of References Cited by Examiner, PTO-892. | 2. <input type="checkbox"/> Notice of Draftsman's Patent Drawing Review, PTO-948. |
| 3. <input checked="" type="checkbox"/> Notice of Art Cited by Applicant, PTO-1449. | 4. <input type="checkbox"/> Notice of Informal Patent Application, PTO-152. |
| 5. <input type="checkbox"/> Information on How to Effect Drawing Changes, PTO-1474. | 6. <input type="checkbox"/> |

Part II SUMMARY OF ACTION

1. ☒ Claims 1-14 are pending in the application.

Of the above, claims _____ are withdrawn from consideration.

2. ☒ Claims 3 and 7 have been cancelled.

3. ☐ Claims _____ are allowed.

4. ☒ Claims 1-2, 4-6, 8-14 are rejected.

5. ☐ Claims _____ are objected to.

6. ☐ Claims _____ are subject to restriction or election requirement.

7. ☐ This application has been filed with Informal drawings under 37 C.F.R. 1.85 which are acceptable for examination purposes.

8. ☐ Formal drawings are required in response to this Office action.

9. ☐ The corrected or substitute drawings have been received on _____. Under 37 C.F.R. 1.84 these drawings are ☐ acceptable; ☐ not acceptable (see explanation or Notice of Draftsman's Patent Drawing Review, PTO-948).

10. ☐ The proposed additional or substitute sheet(s) of drawings, filed on _____, has (have) been ☐ approved by the examiner; ☐ disapproved by the examiner (see explanation).

11. ☐ The proposed drawing correction, filed _____, has been ☐ approved; ☐ disapproved (see explanation).

12. ☐ Acknowledgement is made of the claim for priority under 35 U.S.C. 119. The certified copy has ☐ been received ☐ not been received ☐ been filed in parent application, serial no. _____; filed on _____.

13. ☐ Since this application appears to be in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11; 453 O.G. 213.

14. ☐ Other

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1. The title of the invention is not descriptive. A new title is required that is clearly indicative of the invention to which the claims are directed.

The following title is suggested: TIRE WITH APEX RUBBER BLEND AND METHOD OF MAKING SAME.

2. The following guidelines illustrate the preferred layout and content for patent applications. These guidelines are suggested for the applicant's use.

Arrangement of the Specification

The following order or arrangement is preferred in framing the specification and, except for the title of the invention, each of the lettered items should be preceded by the headings indicated below.

- (a) Title of the Invention.
- (b) Cross-References to Related Applications (if any).
- (c) Statement as to rights to inventions made under Federally-sponsored research and development (if any).
- (d) Background of the invention.
 - 1. Field of the Invention.
 - 2. Description of the Related Art including information disclosed under 37 C.F.R. §§ 1.97-1.99.
- (e) Summary of the Invention.
- (f) Brief Description of the Drawing.
- (g) Description of the Preferred Embodiment(s).
- (h) Claim(s).
- (i) Abstract of the Disclosure.

Content of Specification

- (a) Title of the Invention. (See 37 C.F.R. § 1.72(a)). The title of the invention should be placed at the top of the first page of the specification. It should be brief but technically accurate and descriptive, preferably from two to seven words.

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- (b) Cross-References to Related Applications: See 37 C.F.R. § 1.78 and section 201.11 of the M.P.E.P.
- (c) Statement as to rights to inventions made under Federally sponsored research and development (if any): See section 310 of the M.P.E.P.
- (d) Background of the Invention: The specification should set forth the Background of the Invention in two parts:
 - (1) Field of the Invention: A statement of the field of art to which the invention pertains. This statement may include a paraphrasing of the applicable U.S. patent classification definitions of the subject matter of the claimed invention. This item may also be titled "Technical Field".
 - (2) Description of the Related Art: A description of the related art known to the applicant and including, if applicable, references to specific related art and problems involved in the prior art which are solved by the applicant's invention. This item may also be titled "Background Art".
- (e) Summary: A brief summary or general statement of the invention as set forth in 37 C.F.R. § 1.73. The summary is separate and distinct from the abstract and is directed toward the invention rather than the disclosure as a whole. The summary may point out the advantages of the invention or how it solves problems previously existent in the prior art (and preferably indicated in the Background of the Invention). In chemical cases it should point out in general terms the utility of the invention. If possible, the nature and gist of the invention or the inventive concept should be set forth. Objects of the invention should be treated briefly and only to the extent that they contribute to an understanding of the invention.
- (f) Brief Description of the Drawing(s): A reference to and brief description of the drawing(s) as set forth in 37 C.F.R. § 1.74.
- (g) Description of the Preferred Embodiment(s): A description of the preferred embodiment(s) of the invention as required in 37 C.F.R. § 1.71. The description should be as short and specific as is necessary to describe the invention adequately and accurately. This item may also be titled "Best Mode for Carrying Out the Invention". Where elements or groups of elements, compounds, and processes, which are

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conventional and generally widely known in the field of the invention described and their exact nature or type is not necessary for an understanding and use of the invention by a person skilled in the art, they should not be described in detail. However, where particularly complicated subject matter is involved or where the elements, compounds, or processes may not be commonly or widely known in the field, the specification should refer to another patent or readily available publication which adequately describes the subject matter.

- (h) Claim(s) (See 37 C.F.R. § 1.75): A claim may be typed with the various elements subdivided in paragraph form. There may be plural indentations to further segregate subcombinations or related steps.
- (i) Abstract: A brief narrative of the disclosure as a whole in a single paragraph of 250 words or less.

3. The specification is replete with grammatical errors too numerous to mention specifically. The specification should be revised carefully. Examples of such errors are: "The plies" (should be Carcass plies since only one ply was previously introduced, p. 1 line 26; similarly, in lines 31 and 35 of page 1 and lines 1 and 4 of page 2 "ply" should be deleted since there is not necessarily just one carcass ply in a tire); "a interfacial" (should be an interfacial, p. 2 line 2); "flexten" (p. 2 line 7 - no such word unless it's a trademark name, in which case its status as a trademark should be indicated).

4. Claims 1-2, 4-6, 8-14 are rejected under 35 U.S.C. § 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant

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regards as the invention.

In claims 1 and 5 applicants recite the major and minor melting point ranges for the trans 1,4-polybutadiene having a "65 to about 90" percent trans 1,4-content, a "5 to about 20" percent vinyl 1,2-content, and a "2 to about 15" percent cis 1,4-content, however in the specification these melting point ranges are disclosed only for the narrower ranges of "about 75 to about 85" percent trans 1,4-content, "about 12 to about 18" percent vinyl 1,2-content, and "about 3 to about 8" percent cis 1,4-content (spec. p. 5 lines 3-12). Can these melting point ranges be achieved with the broader trans 1,4-content, vinyl 1,2-content, and cis 1,4-content now recited in claims 1 and 5? If not, applicants should either delete the melting point limitations from claims 1 and 5 or recite in claims 1 and 5 the corresponding narrower content ranges. If so, this should be made clear in the specification.

Also, applicants should make the following amendments to the claims to clarify that all content ranges are by weight and to provide proper grammar and antecedent basis: claim 1, rewrite such that in line 3 before "rubber" is inserted --diene--, in line 4 "rubber" is changed to --rubber-- (claim rewriting error) and before "cis 1,4-" is inserted --and--, in line 6 "have" is

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changed to --having-- (claim rewriting error), in lines 7 and 8 after "percent" (all occurrences) is inserted --by weight--, in line 7 "a" (second and third occurrences) is deleted, and in line 8 "a" (first occurrence) is deleted; claim 4, rewrite as--

4. (amended) The tire of claim 1 [3] wherein said at least one diene rubber [from about 80 to about 97 parts by weight] is natural rubber.

--; claim 5, rewrite such that in line 8 before "as" is inserted --and--, in lines 10 and 11 after "percent" (all occurrences) is inserted --by weight--, and in line 11 "a" (first, second, and fourth occurrences) is deleted and after "vinyl 1,2" is inserted -- - --; claim 8, rewrite as--

8. (amended) The method of claim 5 wherein said at least one diene rubber [from about 80 to about 97 parts by weight] is natural rubber.

--; claims 9 and 12 lines 2 and 3, after "percent" (all occurrences) insert --by weight--; claim 14 line 2, change " (M_n) " to -- (M_w) --.

5. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

6. Claims 1-2, 4-6, 8-14 are rejected under 35 U.S.C. § 103 as being unpatentable over Sandstrom et al., '838 in view of

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European Patent Application 0410311 or, alternatively, in view of European Patent Application 0461329 or Japanese Patent Application 1-135847.

These references are combined for the same reasons as set forth in Paper Number 12, para. 3. The trans 1,4-polybutadiene disclosures in Sandstrom et al. '838 either disclose or render obvious all of applicants' newly added limitations (see col. 2 lines 34-56, col. 3 lines 45-55, and the Examples).

7. Claims 1-2, 4-6, 8-14 are rejected under 35 U.S.C. § 103 as being unpatentable over Yasuda in view of Sandstrom et al. '838.

These references are combined for the same reasons as set forth in Paper Number 12, para. 4.

8. Claims 1-2, 4-6, 8-14 are rejected under 35 U.S.C. § 103 as being unpatentable over Japanese Patent Application 57-212239 in view of Sandstrom et al. '838.

These references are combined for the same reasons as set forth in Paper Number 12, para. 5.

9. Noted of interest are Hattori et al. (5,017,636), disclosing a rubber composition similar to applicants' which may be used in various parts of a tire such as the "tread, undertread, carcass, sidewall, bead portion and the like" (col. 10 lines 45-47), and the following patents disclosing applicants' rubber composition

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in various parts of a tire: Sandstrom et al. (5,229,459 - rubber surrounding tire cord reinforcement); Sandstrom et al. (5,284,195 - tread base); and Sandstrom et al. (5,386,865 - sidewall).

10. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Adrienne Johnstone whose telephone number is (703) 308-2059. The examiner can normally be reached on Monday through Thursday from 7:30 AM to 6:00 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Michael Ball, can be reached on (703) 308-2058. The fax phone number for this Group is (703) 305-7115.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the Group receptionist whose telephone number is (703) 308-0651.

Adrienne Johnstone/krb
October 12, 1995
October 13, 1995

ADRIENNE C. JOHNSTONE
PRIMARY EXAMINER
GROUP 1300

A handwritten signature in black ink, appearing to read "Adrienne C. Johnstone", is written over the typed name and title.